Writing for Online Reading Section

Writing for Online Reading

Overview

Writing for online is different than writing for paper. The screen is fuzzier, less legible and more difficult for people to gaze at for long periods of time. People read text online differently than they read text on paper. Paper documents have natural affordances, visual clues as to use, that must be considered when designing an online document. Writing for online reading requires adhering to the principles of good clear writing and adjusting for the differences of the online medium and online user.

General Writing Standards

The following writing standards are to be adopted across all Windows-based and web-based CDC surveillance applications using HTML. These standards should lead to a more readable interface.

Use active voice

Users expect computers to speak simply, directly and accurately, as shown in the table titled *Active Voice Examples*. Write sentences in active, not passive, voice. Active sentences are more immediate, compelling, and easier for the user to process and remember.

Active Voice Examples

Instead of this…	Say this.
Choice is input by the user	You select an option
… are sorted by the program	The program sorts …
Limits are adjusted manually	Set limits manually

Do not use contractions.
Contractions (e.g., isn't, don't) contain apostrophes which are sometimes hard to see on the screen. Instead, spell out the words (e.g., is not, do not). Possessive words must have the apostrophe. (e.g., the program's interface) Remember that the possessive form of "it" is "its". "It's" is a contraction for "it is".

Keep the column length to one screen or less.
Do not force the reader to scroll down to finish a column, and then scroll back up to read the next column.

Do not block text.
Blocked text has a straight vertical edge on both left and right margins. Do not block text online. Blocking text leads to unpredictable spacing adjustments as shown in the figure titled *Blocked Text Example*.

Blocked Text Example

Text in many printed materials is blocked, providing a pleasing, balanced look to the page. When text is blocked, spacing between words must be carefully controlled, otherwise unsightly gaps appear between words, interrupting the reader's eye flow. Print processes have a large degree of control over this spacing. Online media does not.

Emphasize text using bold or italics.
The preferred way to emphasize text online is to make it bold. Italicizing the text is an acceptable alternative as long as the readability of the text is maintained. Never use underline, all caps, increased point size, or blinking to emphasize text.

General Writing Guidelines

The following guidelines will facilitate the user's ability to read and understand writing online. These guidelines should be applied across CDC software and web-based surveillance applications using HTML.

People find it painful to read too much text online. The light from the screen is harder on the eyes than print on paper and our eyes have to do more work. People read 25% more slowly from screens than from paper and retain less information. Clear, concise writing is essential.

Format text for readability
Users do not want to read more than they have to. Appearance matters. If text looks difficult to read, users will not read it.

- *Keep paragraphs small and separate with white space. Small paragraphs are easier to read than long ones.*

- *Do not present text in all capital letters. Text in all capital letters is hard to read because there is very little differentiation between letters. Use mixed case, upper and lower case together, for reading ease. Also, on the Web, words in all caps have the negative connotation of yelling (See the Fonts section of the CDC Style Guide).*
- *Use "eye catchers" to help the user know where to start reading. Presentations commonly include "eye catchers" in the form of "bullets."*
- *Use headlines and subheads to give the user an overall contextual understanding of the content without reading every word. Headlines and subheads also entice the user to focus their attention on the screen and to glean information about the content of the underlying text.*

Use columns to limit length of text lines to 40-60 characters to aid readability.
When lines of text are too long, users will have difficulty locating the beginning of the next line. They may accidentally reread lines of text that they just read. Columns are a natural way to limit the length of a line of text and improve readability.

Remember these considerations when presenting text in columns:

- *Narrow columns can cause problems if the lines are too short by breaking up the syntactic groupings of words, a cue that readers use to understand a cluster of words.*

- *Provide adequate space between columns to aid readability. Inadequately spaced columns can cause words in different columns to run together.*

Use left-justified text primarily.
Left-justified text has a straight vertical edge on the left margin. Left-justify most text as shown in the figure titled *Left-Justified Example*.

Left-Justified Example

Text in most printed material in Western countries is left-justified because people read from left to right. As the reader's eyes swing to the left, looking for the beginning of the next line, the straight edge of left-justified text provides a consistent, easy-to-find point of reference.

Use centered and right-justified text carefully
Centered text is centered between the margins and may have no straight vertical edges. Right-justified text has a straight vertical edge on the right margin. Use centered and right-justified text carefully. Not only must you create a straight edge of text as a point of reference, but you must also be careful to retain syntactic groupings of words. The figures titled *Center Text* and *Right-Justify Text* illustrate acceptable ways to center and right-justified text.

Center Text
If you want to center or right-justify text, be sure that the resulting block of text forms a line enabling the user to find the next line of text easily.

Right-Justify Text
Be sure to retain syntactic grouping of words that aids the reader's understanding of the text.

Use familiar words

Use short, simple, familiar words. Avoid abstract words, as shown in the table titled *Familiar Word Translations*.

Familiar Word Translations

Instead of this…	Say this.
Hardcopy output device	The printer
Status indicator LED	Warning light
Option selection mechanism	A list of choices

Keep syntax simple

Avoid complex, formal language and complicated sentence structures that confuse the user. Stay with simple declarative and imperative sentences, as shown in the table titled *Simple Syntax Examples*.

Simple Syntax Examples

Instead of this…	Say this.
The user should by now have established the chemical balance.	Set the chemical balance.
The text height, which is the page height minus margins, can be set on Panel P4.	Text height is the page height less margins. Set page height on Panel P4.

Use the user's terminology

Avoid computer terminology. Messages should be in the user's vocabulary and should use terms, units and names from the user's point of reference as shown in the table titled *User Terminology Examples*.

User Terminology Examples

Instead of this…	Say this.
Invalid parameter	Size must be 12, 24, or 36
Print Manager error 73	Please turn on the printer.
Syntax error	File must be a .txt file.

It is okay to use jargon, as long as it is the user's jargon. Jargon unites members of a specialized field and adds precision and interest to the content. Be careful not to apply a new meaning to old words.

Emphasize over-looked words and symbols

Avoid easily misread words, punctuation, and phrases. Emphasize small but important words that could otherwise be overlooked by bolding or italicizing the word. The table titled *Overlooked Words and Prefixes* shows some of the most commonly overlooked words and prefixes. Take care that prefixes do not appear separate from the root word due to hyphenation or word spacing. Avoid abbreviations that can confuse the user.

Overlooked Words and Prefixes

Words	Prefixes
yes	In
no	Un
and	Non
or	Dis
if	
not	

Use only standard, easily read symbols as shown in the table titled *Easily Read Symbols*. Trademarks and copyright symbols may need to be increased in point size slightly for legibility. Especially avoid colons and semicolons. They are hard to see online and many people do not know the difference between them anyway.

Easily Read Symbols

Standard Symbol
$
*
@
%
&

Do not make the computer sound human

Avoid the voice and viewpoint of a human being as shown in the table titled *Non-Human Translations*. Do not address the user in the first person.

Non-Human Translations

Instead of this…	Say this.
I will begin when you press Enter	Press Enter to begin
My memory is overloaded	Too many items to process
I don't understand	Please retype your command

When describing the computer or speaking to the user, avoid words that attribute human characteristics to the computer. Examples of words that are attributed to people versus those words that are attributed to computers are shown in the table titled *People versus Computer Words*.

People versus Computer Words

Words that apply to people	Words that apply to computers
Know	process
Think	sort
Understand	store
Remember	retrieve
Ask	use
Tell	operate
Speak	direct
	control
	calculate

Apply a consistent language style.

Inconsistent language confuses the user. If you phrase, format and display information consistently, the user can quickly and easily learn the conventions used throughout the application or web site. When designing for a Windows environment, you must become familiar with the "language" of Windows and use the words the user expects and understands. Similarly, certain standards and conventions have evolved in the Web environment. The table titled Inconsistent Terminology Examples shows the many ways a user may be instructed to "enter a system" and "leave a system". See the section titled *Metaphors and Navigation* for CDC's standard terminology for entering and leaving a system.

Inconsistent Terminology Examples

Enter a system	Leave a system
log on	exit
log in	log out
Logon	logoff
Login	off
sign in	bye
sign on	quit
	exit
	terminate
	cancel

HTML Specific Guidelines

For web based applications using HTML, the following guidelines are recommended and should be applied across CDC web-based applications using HTML.

Limit the amount of text on each web page
One standard 14-15" screen contains about 250-275 words. Limit the amount of text on each web page to the amount that fits on two basic screens, or one scroll-down. When in doubt, break forms into multiple pages.

Use hypertext appropriately.
Links can encourage a reader to continue reading but be careful about the number of links you place in text on a page. Too many links in one paragraph are distracting. If you have many links, consider placing them together at the end of an appropriate paragraph or at the end of the page.

Recommended Readings

Horton, William K. *Designing & Writing Online Documentation*. John Wiley & Sons, 1990

Morkes, John and Nielsen, Jakob, *How to Write for the Web*. 1997

Waters, Crystal, *Universal Web Design.* New Riders Publishing, 1997

Helpful Web Sites

The Microsoft Developers Network Online Library of Books, specifically the online version of *The Windows Interface Guidelines for Software Design*
http://msdn.microsoft.com/isapi/msdnlib.idc?theURL=/library/books/winguide/PLATFRM2/D5/S115B5.HTM

The Web Reviews online publication. Contains great in-depth articles on every aspect of web site authoring.
http://www.webreview.com/wr/pub

Jakob Nielsen's web site contains a comprehensive archive of articles on uasbility from his column, *The Alert Box*.
http://www.useit.com

Keith Instone maintains a very useful site referencing web interface information.
http://usableweb.com/